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APPLICATION N	0.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/843,396	09/843,396 04/26/2001		Stefan Dutzmann	Mo5334/LeA 32,232 4187	
34469	7590	07/25/2006		EXAMINER	
BAYER	CROPSCI	ENCE LP		CHOI, FI	RANK I
Patent De	partment				
100 BAY	ER ROAD		ART UNIT	PAPER NUMBER	
PITTSBURGH, PA 15205-9741				1616	
				DATE MAIL ED: 07/25/2006	

Please find below and/or attached an Office communication concerning this application or proceeding.

!	Application No.	Applicant(s)				
	09/843,396	DUTZMANN ET AL.				
Office Action Summary	Examiner	Art Unit				
	Frank I. Choi	1616				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
<ol> <li>Responsive to communication(s) filed on 16 March 2006.</li> <li>This action is FINAL. 2b)  This action is non-final.</li> <li>Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.</li> </ol>						
Disposition of Claims						
<ul> <li>4) Claim(s) 6-9 is/are pending in the application.</li> <li>4a) Of the above claim(s) is/are withdrawn from consideration.</li> <li>5) Claim(s) is/are allowed.</li> <li>6) Claim(s) 6-9 is/are rejected.</li> <li>7) Claim(s) is/are objected to.</li> <li>8) Claim(s) are subject to restriction and/or election requirement.</li> </ul>						
Application Papers						
<ul> <li>9) The specification is objected to by the Examiner.</li> <li>10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.  Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).</li> <li>11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.</li> </ul>						
Priority under 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).</li> <li>a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority documents have been received.</li> <li>2. Certified copies of the priority documents have been received in Application No. 09/402,866.</li> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>						
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date	4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:					

**Art Unit: 1616** 

## **DETAILED ACTION**

A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on 3/16/2006 has been entered.

## Claim Rejections - 35 USC §102/103

The rejection of Claim 6 under 35 U.S.C. 102(f) is withdrawn solely because the ratio between the compounds is not expressly disclosed by US Pat. 6,624,183, 6,297,236 or 6,620,822. Section 103(c) precludes a rejection under 103(a) as the assignee in the present Application is the assignee for said US Patents.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 6-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over the acknowleged prior art in view of US Pat. 3,903,090.

Applicant acknowledges that prothioconazole has good fungicidal activity but at low application rates it is in some cases not satisfactory (Specification, Pg. 1). Applicant acknowledges that a large number of triazole derivatives, aniline derivative, dicarboimides and other heterocycles can be employed for controlling fungi, such as set forth in EP A 0 040 345, De A 2 201 063, DE -A 2 324 0 10, Pesticide Manual, 9<sup>th</sup> ed (1991), pages 249 and 827, U S

Art Unit: 1616

Pat. No. 3, 903, 090 and EP – A 0 206 999, and that likewise these compounds are not always satisfactory at low application rates (Specification Pg. 1). Applicant acknowledges that compounds combined with prothioconazole are all known compounds (Specification, pages 14-17).

US Pat. 3,903,090 discloses that the N-(3,5-dihalophenyl)-imide compounds can be extended with suitable carriers and can be combined with other fungicides (Column 32, lines 20-39).

The prior art discloses that the compounds are known fungicides. The difference between the prior art and the claimed invention is that the prior art does not expressly disclose the combination of prothioconaozole with the other fungicides. However, the prior art amply suggests the same as it is known that that the compounds used singly are effective fungicides, and that fungicides can be combined together and be formulated with suitable extenders. As such, it would have been well within the skill of and one of ordinary skill in the art would have been motivated to combine prothioconazole with one or more of the other fungicides with the expectation that the combination would be an effective fungicide and that that the formulations could be extended with suitable carriers.

"It is prima facie obvious to combine two compositions each of which is taught by the prior art to be useful for the same purpose, in order to form a third composition to be used for the very same purpose.... [T]he idea of combining them flows logically from their having been individually taught in the prior art." In re Kerkhoven, 850, 205 USPQ 1069, 1072 (CCPA 1980) (citations omitted) (Claims to a process of preparing a spray-dried detergent by mixing together two conventional spray-dried detergents were held to be prima facie obvious.). See also In re Crockett, 126 USPQ 186 (CCPA 1960) (Claims directed to a method and material for treating

Art Unit: 1616

cast iron using a mixture comprising calcium carbide and magnesium oxide were held unpatentable over prior art disclosures that the aforementioned components individually promote the formation of a nodular structure in cast iron.); and Ex parte Quadranti, 25 USPQ2d 1071 (Bd. Pat. App. & Inter. 1992) (mixture of two known herbicides held prima facie obvious).

Examiner has duly considered Applicant's arguments but deems them unpersuasive.

Examiner argues that the claims, as amended, are commensurate in scope with the evidence of synergy. Applicant, however, does not specifically indicate what evidence supports the assertion that the ranges claimed are commensurate in scope with said evidence. The Specification does not appear to provide evidence of synergy for all compounds and/or ranges. Specifically, where the efficacy of the combination of the active agents are provided the actual efficacy for prothioconaozole and active compounds 1,2,11, 12 (1:5 ratio),20 are not provided, as such, the expected efficacy cannot be calculated in order to establish whether synergy is present. With respect to compounds 4, 15(1:1),21,22, 24, there does not appear to be any evidence of synergy. Whether the unexpected results are the result of unexpectedly improved results or a property not taught by the prior art, the "objective evidence of nonobviousness must be commensurate in scope with the claims which the evidence is offered to support." In re Clemens, 206 USPO 289, 296 (CCPA 1980) (Claims were directed to a process for removing corrosion at "elevated temperatures" using a certain ion exchange resin (with the exception of claim 8 which recited a temperature in excess of 100C). Appellant demonstrated unexpected results via comparative tests with the prior art ion exchange resin at 110C and 130C. The court affirmed the rejection of claims 1-7 and 9-10 because the term "elevated temperatures" encompassed temperatures as low as 60C where the prior art ion exchange resin was known to perform well. The rejection of claim 8, directed to a temperature in excess of 100C, was

reversed.). See also In re Peterson, 65 USPQ2d 1379, 1382-5 (Fed. Cir. 2003) (data showing improved alloy strength with the addition of 2% rhenium did not evidence unexpected results for the entire claimed range of about 1-3% rhenium); In re Grasselli, 218 USPQ 769, 777 (Fed. Cir. 1983) (Claims were directed to certain catalysts containing an alkali metal. Evidence presented to rebut an obviousness rejection compared catalysts containing sodium with the prior art. The court held this evidence insufficient to rebut the prima facie case because experiments limited to sodium were not commensurate in scope with the claims.). As such, the rejection herein is maintained.

Therefore, the claimed invention, as a whole, would have been *prima facie* obvious to one of ordinary skill in the art at the time the invention was made, because every element of the invention has been collectively taught by the combined teachings of the references.

Claims 6-9 are rejected under 35 U.S.C. 103(a) as being obvious over WO 96/16048 and the acknowledged prior art.

WO 96/16048 discloses the combination of prothioconaozole with other fungicides, including propineb, dimethomorph and fosetyl-aluminum, to widen the spectrum of action, to prevent build of resistance and that the activity of the mixture in many cases exhibits synergistic activity and that the formulations are prepared in a known manner, for example by mixing the active compounds with surfactants and extenders, and that application concentrations of the active compounds depend on the nature and occurrence of the microorganisms to be controlled and on the composition of the material to be protected and the optimum amount to be employed can be determined by a series of tests(see entire reference, especially, Pg. 42, lines 11-15, Pg. 43, lines 15-30, Pg. 44, Pg. 47).

Art Unit: 1616

The acknowledged prior art is cited for the same reasons as above and are incorporated herein to avoid repetition.

The prior art discloses that prothioconaozole can be combined with other fungicides, including propineb, dimethomorph and fosetyl-aluminum. The difference between the prior art and the claimed invention is that the prior art does not expressly disclose the combination of prothioconaozole with other fungicides. However, the acknowledged prior art amply suggests the same as it is known that that the compounds used singly are effective fungicides, that prothioconazole can be combined with other fungicides and that they can be formulated with surfactants and extenders. As such, it would have been well within the skill of and one of ordinary skill in the art would have been motivated to combine prothioconazole with one or more of the other fungicides with the expectation that the combination would be more effective than each alone and that surfactants and extenders would be suitable for use in the formulation.

"It is prima facie obvious to combine two compositions each of which is taught by the prior art to be useful for the same purpose, in order to form a third composition to be used for the very same purpose.... [T]he idea of combining them flows logically from their having been individually taught in the prior art." In re Kerkhoven, 850, 205 USPQ 1069, 1072 (CCPA 1980) (citations omitted) (Claims to a process of preparing a spray-dried detergent by mixing together two conventional spray-dried detergents were held to be prima facie obvious.). See also In re Crockett, 126 USPQ 186 (CCPA 1960) (Claims directed to a method and material for treating cast iron using a mixture comprising calcium carbide and magnesium oxide were held unpatentable over prior art disclosures that the aforementioned components individually promote the formation of a nodular structure in cast iron.); and Ex parte Quadranti, 25 USPQ2d 1071 (Bd. Pat. App. & Inter. 1992) (mixture of two known herbicides held prima facie obvious).

Art Unit: 1616

Examiner has duly considered Applicant's arguments but deems them unpersuasive for the reasons above and the further reasons below.

Examiner had indicated to Applicant that the filing of the translation of the foreign priority document would overcome the rejection herein. However, upon further consideration, Examiner notes that the effective filing date of the present application in view of the translation is 4/18/1997. WO 96/16048 was published on 5/30/1996 and names at least one inventor that is not named in the present Application. As such, said reference qualifies as prior art under 35 USC 102(a) for purposes of the rejection under 103(a).

Therefore, the claimed invention, as a whole, would have been *prima facie* obvious to one of ordinary skill in the art at the time the invention was made, because every element of the invention has been collectively taught by the combined teachings of the references.

## Conclusion

A facsimile center has been established in Technology Center 1600. The hours of operation are Monday through Friday, 8:45 AM to 4:45 PM. The telecopier number for accessing the facsimile machine is 571-273-8300.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Frank Choi whose telephone number is (571)272-0610. Examiner maintains a compressed schedule and may be reached Monday, Tuesday, Thursday, Friday, 6:00 am – 4:30 pm (EST).

If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's Supervisor, Dr. Johann Richter, can be reached at (571)272-0646. Additionally, Technology Center 1600's Receptionist and Customer Service can be reached at (571) 272-1600.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Frank Choi Patent Examiner Technology Center 1600 July 10, 2006

> Johann Richter, Ph. D. Esq. Supervisory Patent Examiner Technology Center 1600